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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/622,268	07/17/2003	Yuichi Ise	9475/0M770US0	4219

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EXAMINER

DHARIA, PRABODH M

ART UNIT	PAPER NUMBER
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2673

DATE MAILED: 01/23/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/622,268	ISE ET AL.	
	Examiner	Art Unit	
	Prabodh M. Dharia	2673	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 02 December 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-6 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 3 and 4 is/are allowed.
- 6) ☒ Claim(s) 1, 2, 5 and 6 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 17 July 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|----------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date <u>02-15-05</u> . | 6) <input type="checkbox"/> Other: _____ |

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1. **Status:** Receipt is acknowledged of papers submitted on December 02, 2005 under amendments and new claims, which have been placed of record in the file. Claims 1-6 are pending in this action.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1,2 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kambara et al. (6,091,406) in view of Saijo Masaru et al. (JP 11-086698).

Regarding Claim 1, Kambara et al. teaches a pointing input device (Col. 21, Lines 33-35) comprising: a display panel for displaying (Col. 21, Lines 46-50, 30-32) any pointing input information on a display area thereof (Col. 19, Lines 45-51); a transparent protective plate laminated on the display area of the display panel (Col. 20, Lines 26-29, Col. 21, Line 60 to Col. 22, Line 12, Col. 28, lines 56-65); a piezoelectric substrate attached to the transparent protective plate, for converting deformation (Col. 20, Lines 26-29, Col. 21, Line 60 to Col. 22, Line 12, Col. 28, lines 56-65); caused by a push against the transparent protective plate into an electric signal (Col. 20, Lines 2-10); and outputting the electric signal (Col. 20, Lines 2-10); and the pointing input device (Col. 21, Lines 33-35) outputting push detection data together with the

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pointing position data (Col. 19, line 61 to Col. 20, Line 10), when the electric signal is outputted from the piezoelectric substrate (Col. 19, Line 61 to Col. 20, Line 10) and the push against the transparent protective plate (Col. 20, Lines 26-29, Lines 2-10, Col. 21, Line 60 to Col. 22, Line 12, Col. 28, lines 56-65); is judged while the optical touch panel is detecting the pointing input (Col. 19, Line 19 to Col. 20, Line 10).

Kambara et al. fails to teach an optical touch panel disposed on the transparent protective plate, for emitting light beams for reticulately scanning an input operation area of the optical touch panel along orthogonal X and Y directions to detect a pointing input and a pointing input position in the input operation area when the light beams are intercepted by the pointing input, a display area of the input operation area being visible through the transparent protective plate; the pointing input device outputting pointing position data indicating the pointing input position, while the optical touch panel detects the pointing input.

However, Saijo et al. teaches an optical touch panel (paragraph 1) disposed on the transparent protective plate (page 5, paragraphs 11-14), for emitting light beams for reticulately scanning an input operation area of the optical touch panel along orthogonal X and Y directions to detect a pointing input (page 5, paragraph 15) and a pointing input position in the input operation area when the light beams are intercepted by the pointing input (page 5, paragraphs 15,16), a display area of the input operation area being visible through the transparent protective plate (page 5, paragraphs 15, 21-23); the pointing input device outputting pointing position data indicating the pointing input position, while the optical touch panel detects the pointing input (page 5, paragraphs 15, 21-23).

Thus it is obvious to one in the ordinary skill in the art at the time of invention was made to incorporate teaching of Saijo et al. in Kambara et al. teaching for having an optical touch panel detecting pointing device touch input by the light beams of the X-axila and y-axial optical axes corresponding to the designation by the finger can be inputted, without being affected by a disturbance.

Regarding Claim 2, Kambara et al. teaches a pointing input device (Col. 21, Lines 33-35) comprising: a display panel for displaying (Col. 21, Lines 46-50, 30-32) any pointing input information on a display area thereof (Col. 19, Lines 45-51); a transparent protective plate laminated on the display area of the display panel (Col. 20, Lines 26-29, Col. 21, Line 60 to Col. 22, Line 12, Col. 28, lines 56-65); a piezoelectric substrate attached to the transparent protective plate, for converting deformation (Col. 20, Lines 26-29, Col. 21, Line 60 to Col. 22, Line 12, Col. 28, lines 56-65); caused by a push against the transparent protective plate into an electric signal (Col. 20, Lines 2-10); and outputting the electric signal (Col. 20, Lines 2-10); and the pointing input device (Col. 21, Lines 33-35) outputting push detection data together with the pointing position data (Col. 19, line 61 to Col. 20, Line 10), when the electric signal is outputted from the piezoelectric substrate (Col. 19, Line 61 to Col. 20, Line 10) and the push against the transparent protective plate (Col. 20, Lines 26-29, Lines 2-10, Col. 21, Line 60 to Col. 22, Line 12, Col. 28, lines 56-65); is judged while the optical touch panel is detecting the pointing input (Col. 19, Line 19 to Col. 20, Line 10).

However, Saijo et al. teaches an optical touch panel (paragraph 1) disposed on the transparent protective plate (page 5, paragraphs 11-14), for emitting light beams for reticulately

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scanning an input operation area of the optical touch panel along orthogonal X and Y directions to detect a pointing input (page 5, paragraph 15) and a pointing input position in the input operation area when the light beams are intercepted by the pointing input (page 5, paragraphs 15,16), a display area of the input operation area being visible through the transparent protective plate (page 5, paragraphs 15, 21-23); the pointing input device outputting pointing position data indicating the pointing input position, while the optical touch panel detects the pointing input (page 5, paragraphs 15, 21-23).

Thus it is obvious to one in the ordinary skill in the art at the time of invention was made to incorporate teaching of Saijo et al. in Kambara et al. teaching for having an optical touch panel detecting pointing device touch input by the light beams of the X-axila and y-axial optical axes corresponding to the designation by the finger can be inputted, without being affected by a disturbance.

Regarding Claim 5, Kambara et al. the pointing input device (Col. 21, Lines 33-35) outputting push detection data together with the pointing position data (Col. 19, line 61 to Col. 20, Line 10), when the electric signal is outputted from the piezoelectric substrate (Col. 19, Line 61 to Col. 20, Line 10) and the push against the transparent protective plate (Col. 20, Lines 26-29, Lines 2-10, Col. 21, Line 60 to Col. 22, Line 12, Col. 28, lines 56-65); is judged while the optical touch panel is detecting the pointing input (Col. 19, Line 19 to Col. 20, Line 10).

Saijo et al. teaches a pointing input position in the input operation area when the light beams are intercepted by the pointing input (page 5, paragraphs 15,16), a display area of the input operation area being visible through the transparent protective plate (page 5, paragraphs 15,

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21-23); the pointing input device outputting pointing position data indicating the pointing input position, while the optical touch panel detects the pointing input (page 5, paragraphs 15, 21-23).

Regarding Claim 6, Kambara et al. the pointing input device (Col. 21, Lines 33-35) outputting push detection data together with the pointing position data (Col. 19, line 61 to Col. 20, Line 10), when the electric signal is outputted from the piezoelectric substrate (Col. 19, Line 61 to Col. 20, Line 10) and the push against the transparent protective plate (Col. 20, Lines 26-29, Lines 2-10, Col. 21, Line 60 to Col. 22, Line 12, Col. 28, lines 56-65); is judged while the optical touch panel is detecting the pointing input (Col. 19, Line 19 to Col. 20, Line 10).

Saijo et al. teaches a pointing input position in the input operation area when the light beams are intercepted by the pointing input (page 5, paragraphs 15,16), a display area of the input operation area being visible through the transparent protective plate (page 5, paragraphs 15, 21-23); the pointing input device outputting pointing position data indicating the pointing input position, while the optical touch panel detects the pointing input (page 5, paragraphs 15, 21-23).

Allowable Subject Matter

4. Claims 3,4 are allowed.

5. The following is an examiner's statement of reasons for allowance:

A pointing input device comprising: a display panel for displaying any pointing input information on a display area thereof; a transparent protective plate laminated on the display area of the display panel; a piezoelectric substrate attached to the transparent protective plate, for

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converting deformation caused by a push against the transparent protective plate into an electric signal and outputting the electric signal; and an optical touch panel disposed on the transparent protective plate, for emitting light beams for reticulately scanning an input operation area of the optical touch panel along orthogonal X and Y directions to detect a pointing input and a pointing input position in the input operation area when the light beams are intercepted by the pointing input, a display area of the input operation area being visible through the transparent protective plate; the pointing input device outputting pointing position data indicating the pointing input position, while the optical touch panel detects the pointing input, the pointing input device outputting push detection data together with the pointing position data, when the electric signal is outputted from the piezoelectric substrate and the push against the transparent protective plate is judged while the optical touch panel is detecting the pointing input and the piezoelectric substrate comprises a pair of piezoelectric substrates of narrow and elongated shape, and the piezoelectric substrates are attached to the transparent protective plate and are orthogonal to each other.

Cited references fail to teach bold and underlined above claim.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Response to Arguments

6. Applicant's arguments filed 12-02-2005 have been fully considered but they are not persuasive.

Applicant argues cited references fails to address the problem of accidental activation of the device resulting from momentary insertion of a pen or finger.

Examiner argues, as none of the independent claims recite the limitation “prevention or precautionary action against accidental activation of the device resulting from momentary insertion of a pen or finger”.

Applicant argues there is no suggestion or motivation to combine.

7. Examiner disagrees, as In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, Kambara et al. teaches a pointing input device comprising: a display panel for displaying any pointing input information on a display area thereof; a transparent protective plate laminated on the display area of the display panel; a piezoelectric substrate attached to the transparent protective plate, for converting deformation caused by a push against the transparent protective plate into an electric signal and outputting the electric signal; and an optical touch panel disposed on the transparent protective plate, when the electric signal is outputted from the piezoelectric substrate and the push against the transparent

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protective plate is judged while the optical touch panel is detecting the pointing input (Col. 19, Line 19 to Col. 20, Line 10, Col. 20, Lines 26-29, Lines 2-10, Col. 21, Line 30 to Col. 22, Line 12, Col. 28, lines 56-65); and Saijo et al. teaches an optical touch panel disposed on the transparent protective plate, for emitting light beams for reticulately scanning an input operation area of the optical touch panel along orthogonal X and Y directions to detect a pointing input and a pointing input position in the input operation area when the light beams are intercepted by the pointing input, a display area of the input operation area being visible through the transparent protective plate; the pointing input device outputting pointing position data indicating the pointing input position, while the optical touch panel detects the pointing input (page 5, paragraphs 11-23). Thus combination teaches applicant's claim invention per claims 1,2,5 and 6 and therefore they do obviate.

Conclusion

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event,

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however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Prabodh M. Dharia whose telephone number is 571-272-7668.

The examiner can normally be reached on M-F 8AM to 5PM.

10. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

11. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Any response to this action should be mailed to:

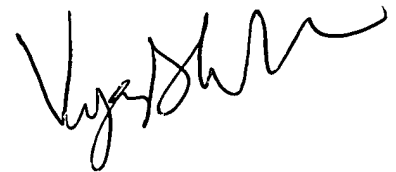
Commissioner of Patents and Trademarks

Washington, D.C. 20231

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January 12, 2006



**VIJAY SHANKAR
PRIMARY EXAMINER**